

The syntactic positions of adverbs and the Second Language Acquisition

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Abstract: Based on the theory of linguistic universal and Second Language Acquisition (SLA), the paper discusses the acquisition of syntactic positions of adverbs in English. According to the data collected, the paper concludes that what adult learners acquire about adverbs is the distinction of different adverbs and the different scopes they take.

Key words: UG (Universal Grammar); acquisition; adjunct; scope

1. Introduction

As early as in the 1960s, Corder pointed out that second language learners' language is systematic. Selinker (1972) also proposed that learners' errors are not random mistakes. From this developed the conception of "inter-language" which proposes that L2 (Second Language) learners internalize a natural language system that can be described in terms of linguistic rules and principles. The generative tradition on inter-language representation is in fact the descendent of the inter-language hypothesis.

Generative grammar mainly investigates 2 fundamental issues: the first issue is how to characterize the speaker's knowledge of a language and how such knowledge is acquired and used by language learners; the second issue is concerned with the characterization of the processes involved in language acquisition.

Behaviourists believe that children learn language solely on the basis of the evidence they are exposed to. Chomsky (1965) argued that many structures of human language are so complex and abstract, it is difficult for children to unconsciously acquire a language only based on the input. This mismatch, known as the "logical problem", can be overcome by assuming that children are born with language faculty. Universal Grammar (UG) is proposed as part of this innate biologically endowed language faculty. UG seeks to explain that how learners come to know the properties of grammar which go far beyond the input, how they know that some things are impossible and why grammars are of one sort rather than another. Researchers with generative backgrounds believe that UG principle is applied uniformly to all grammars of all human languages and along with these principles, UG also makes available to children a set of parameters which account for some of the differences among the world's languages, for instance, the word order and pro drop differences, etc.. The question of parameter setting in SLA is of considerable interest, because L2 learners can be faced with a situation where a principle differs as to its parameter setting value in the first language and the second language. In this case, L2 learners already have one type of parameter setting for their L1 (First Language) learners. This is why some researchers agree that UG has access to first language acquisition, but disagree that UG is available in SLA. This is known as the "access" problem in the literature. If both the L1 and L2 have the same principle, with the same parameter setting, it would be impossible to determine whether L2 learners acquire such knowledge as a result of the operation of UG

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principles or because of the learners' L1 functions in the acquisition of that particular parameter setting.

Findings illustrate that learners demonstrate knowledge of abstract properties which could not have been learned from L2 input alone or on the basis of explicit instruction or from the L1 grammar. Here the author will adopt the idea that UG is available in SLA, although there are disagreements.

The researches within the framework of principles and parameters have exerted considerable influence on the field of SLA. SLA researchers working within this framework of syntactic theory have investigated the extent to which developing second language grammar is constrained by principles of UG. An issue that received considerable attention in the late 1980s and in the early 1990s concerned the role of UG parameters and parameter setting in SLA. The focus of most of this UG-based SLA research was on the adult L2 learners. Just as Ellis (1994) pointed out that there has been extensive theoretical debate regarding the availability of UG in L2 acquisition. But some studies do show that UG can have an access to the SLA. Particularly in recent years, there is a growing body of evidence in this field of the research of SLA. The author just adopts the idea in this paper that UG does function, at least in some aspects, in the learning or acquisition of a L2.

One thing that interests the author most in both his learning and teaching experiences of English as a second language is the learning or acquisition of adverbs/adverbials in sentences. Please look at the following 2 examples:

Examples:

- (1) He had spoken loudly.
- (2) He was shaking my hands tightly.

Studies on adverbs are generally of 2 types: syntactic and semantic. First, please take a look at the syntactic studies. Chomsky (1981; 1995) thought that adjuncts (adverbs and prepositional phrases) can either be adjoined to the left or to the right, which depends on the language parameter setting. Cinque (1999), based on the investigation of Romanic and some other languages, pointed out that co-occurring adverbs tend to have a strict order as the following illustrates:

Mood_{speechact}>Mood_{evaluative}>Mood_{evidential}>Mod_{epistemic}>T(Past)>T(Future)>Mood_{irrealis}>Asp_{habitual}>T(Anterior)
>Asp_{perfect}>Asp_{retrospective}>Asp_{durative}>Asp_{progressive}>Asp_{prospective}>Mod_{root}>Voice>Asp_{celerative}>Asp_{completive}>Asp_{(semel)repetitive}>Asp_{iterative}

Cinque (1999) argued that different types of adverbs occupy different positions in the syntactic structure, each adverb has a corresponding functional category to check its feature. In his analysis, all types of adverbs are left-adjoined.

Thomas Ernst's (2002) study focused on the semantic types of adverbs. Adverbs, according to their semantic type, can be divided into eventive, propositional and factive. The co-occurring adverbs follow the Fact-Event Objects (FEO) Calculus:

The FEO Calculus

- (1) Any FEO type may be freely converted to any higher FEO type but not to a lower one;
- (2) Any FEO (sub)type may be converted to another FEO (sub)type as required by lexical items or coercion operators;
- (3) Events may be interpreted as specified events within PredP.

Apart from the above studies on adverbs/adjuncts, 2 more studies have to be mentioned. Kayne (1994) proposed that each newly introduced item is merged to the left. DAI (2003), following Kayne's proposal, investigated both English and Chinese to put forwards the Generalized Leftward Merger Hypothesis, assuming

that all the adverbs are left-merged.

As can be seen, no matter whether the study is syntactic or semantic, there is disagreement as to the position of the operation merger. If all the adverbs are left-merged, it is difficult to work out why some adverbs in some languages can appear to the right of the verb or verb phrase. Of course, it can be argued that it is the verb that undergoes movement which results in the order, but the thing is that there is no evidence demonstrating the trigger of the movement. So the author still takes Chomsky's stand that adjuncts can either be left-adjoined or right-adjoined. What learners acquiring a language have to do is to set the value of the parameter.

In the study of L2 acquisition, the first thing the author has to do is to collect data. Obviously, 2 sentences are not enough. Bad conclusion will be drawn if the author bases idea only on the above 2 sentences. For instance, according to (1) and (2) sentences, the author may conclude that adverbs in English always fall at the end of sentences. Sure enough, this is wrong because people can easily find sentences with adverbs in other positions of sentences, for example:

Examples:

(3) Frankly, you shouldn't speak to him like that.

(4) Suddenly, the driver made a turn.

(5) He always speaks to his mother like that.

Furthermore, some adverbs seem possible in more than one position. Consider the following examples:

(6) Suddenly, the driver made a turn.

(7) The driver made a turn suddenly.

(8) Albert quickly pushed the hammer up onto the roof.

(9) Albert pushed the hammer quickly up onto the roof.

(10) Albert pushed the hammer up quickly onto the roof.

(11) Albert pushed the hammer up onto the roof quickly.

This also seems true in the first language, for example:

(12) ta xingkui lai le.
He fortunately come Asp.

(13) xingkui ta lai le.

Again the author may conclude that it seems that there are no fixed positions for adverbs, but that is not the case. Take sentences (14) and (15) for example:

(14) *Loudly he had spoken.

(15) *Tightly he was shaking my hands.

What makes the situation more complicated is the co-occurrence of adverbs in one sentence. In this case, there seems to be a fixed order for different adverbs. For instance, people can say sentences (16) and (18), but sentences (17) and (19) are not possible.

(16) Obviously, he had spoken loudly.

(17) *Loudly, he had spoken obviously.

(18) He luckily has wisely refused the offer.

(19) *He wisely has luckily refused the offer.

What is going on? It seems impossible for adult students to learn or acquire the syntactic positions of adverbs in English as a foreign language. There also seems to be no first language transfer that functions. Because in Chinese mother tongue, all the adverbs or adverbials take their positions to the left of verbs linearly, in this sense

people may say formal instruction, such as the classroom teaching will not do. Although people can find that in Chinese co-occurring adverbs also have a relatively fixed order, but it is true to say it is hardly possible to list all the adverbs and calculate the possibilities of their co-occurrences through education. Theoretically speaking, when 2 or more adverbs co-occurring in a sentence, errors will result. But interestingly enough, based on the data the author has collected according to the true or false judgements, most adult learners can tell generally which sentences are possible, while others cannot be accepted, though sometimes people find students may have difficulty in their judgements.

2. Data collection

Ten students are chosen to participate in the test. They are all in their second year of college study. Six of them are non-English majors and 4 are English majors. Sentences for true or false judgements are listed in the following.

- a. George was speaking to him politely.
- b. George was politely speaking to him.
- c. The committee has luckily chosen him.
- d. He has spoken loudly.
- e. Loudly he has spoken.
- f. Peter was treating Bob badly.
- g. Peter was badly treating Bob.
- h. They now have already moved the statue.
- i. They already have now moved the status.
- j. Someone unfortunately probably asked to stay behind.
- k. Someone probably unfortunately asked to stay behind.
- l. Albert quickly pushed the hammer up onto the roof.
- m. Albert pushed the hammer quickly up onto the roof.
- n. Albert pushed the hammer up quickly onto the roof.
- o. Albert pushed the hammer up onto the roof quickly.
- p. Clearly John probably will quickly learn English perfectly.
- q. Probably John clearly will quickly learn English perfectly.
- r. I met him in his office at eight this morning.
- s. I met him at eight this morning in his office.
- t. Similarly, he asked for my help.

3. Result analysis

The result of the judgements shows that most of them can work out which sentences are acceptable, which are less acceptable or ungrammatical. In particular, for sentences d, e, f and g, there is no disagreement. All of them consider d and f are well-formed, while e and g are unacceptable. This illustrates that while learning or acquiring the positions of adverbs of this kind, learners know that they usually only occur at the end of a sentence. There is no influence of first language transfer, because in Chinese these adverbs only occur directly before verbs of the sentences. People may propose, within the framework of Universal Grammar (UG), that these adverbs

adjoin to VP, and little learning experience will be enough for the students to set the parameter: In English, it is left-adjoined, while in Chinese, it is right-adjoined. The following diagram will illustrate this (see Figure 1 and Figure 2):

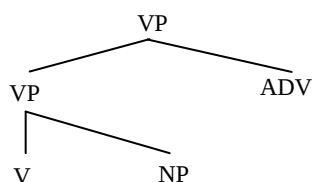


Figure 1 The parameter diagram of verbs in English

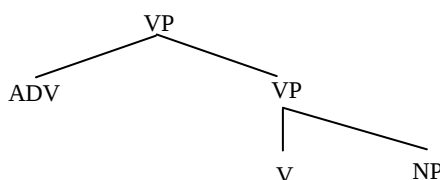


Figure 2 The parameter diagram of verbs in Chinese

The similarity between Figure 1 and Figure 2 is that in both adverbs are adjoined to VP. And the difference is that in English adverbs of this kind is left-adjoined, while in Chinese they are left-adjoined. The reason for the ill-formedness of e and g is that this kind of adverbs can only occur internal to VP, they can not occur above VP. This can also be illustrated from the following examples:

Examples:

(20) Possibly he had left.

(21) *He had left possibly.

Examples (20) and (21) show that adverbs like “possibly” can not occur internal to VP, its syntactic position must be higher than VP in the structure. And the other examples can generally be explained within the framework of UG.

In the late 1980s and in the early 1990s, Chomsky (1991) argued that there are 3 main functional categories in the UG, they are C, T and v. C select TP, T selects vP and v selects VP. Adverbs which are considered to be adjuncts in the generative literature can only adjoined to XPs, which are the maximal projections of different heads. That is to say in this case adverbs can mainly adjoin to CP, TP, vP and VP. For the time being, people just ignore the parameter of different languages. Then the author may have the following tree diagram (see Figure 3).

If what Chomsky argued is true, then we may say adverbs can be divided into several groups. Different groups of adverbs can only be adjoined to different XPs. In the case, they can be adjoined to CP, TP, vP and VP respectively. It seems meaningless if people just stop here, because the problem is not resolved. That is what adverbs can adjoin to CP, TP, vP and VP respectively. The evidence to argue for this is to examine the characteristics of different functional heads. In the generative grammar, C is closely related to mood or modality, which means that adverbs expressing mood or modality can adjoin to CP, others cannot. T is related to tense, so time adverbs can adjoin to TP, “v” is something like an eventive light verb, which takes an event as its complement. So in this way, students will only have to learn the meanings of different adverbs.

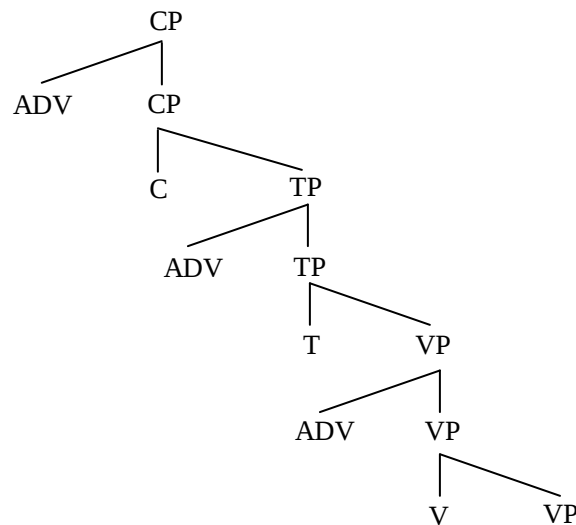


Figure 3 The parameter diagram of tense complement phrases

And as for the co-occurring adverbs, the hypothesis is that the adverbs below CP should follow a strict linear order which can be shown through hierarchical structures, because T is the farthest position which can be linked to a verb. That is to say, there is a strict order within TP. Just as the author argues above, the author proposes adverbs within TP in English are all right-adjoined. Suppose that adverbs within TP cross-linguistically may either left-adjoined or right-adjoined, little learning is enough for the setting of parameters in a language.

The other thing that learners acquire about adverbs is the scope of adverbs, which is closely related to syntax and semantics. What is scope? Aoun and LI (1993) defined the scope as “The scope of alpha is the set of nodes that alpha c-commands”.

To know this, take the above Figure 3 for illustration. In Figure 3, the highest ADV takes all the other nodes except the highest CP as its scope. To be more precise, people say the highest ADV takes the scope over its sister node and what its sister node dominates. In this way, people can also explain why some adverbs are in higher syntactic positions. In Figure 3, the highest adverb takes scope over the other 2 adverbs. Why do people say that students also acquire the idea of scope? Because in the parts above, people only give a general distinction among different adverbs, but the truth is that adverbs of the same kind can also co-occur, especially adverbs adjoin to vP. They can not only co-occur, but also sometimes they can change their positions. All the other work argues that the different positions of an adverb may involve movement. The idea is that if an adverb can appear in different positions, it only means that it varies in its scope. Sentences l, m, n and o illustrate this point. Different positions of the adverb take different scopes. Linearly, it is the left-most element in English that takes the widest scope. And the author proposes the following principle based on the idea of scope: as-far-as-a-verb-can-check-its-features theory.

Within TP, there seems to be a strict order for adverbs because the head T is the farthest node which can be in relation to the node V.

This idea is very important for acquisition of positions of adverbs, because as the author mentions above, within TP there is a strict order of co-occurring adverbs. This explains that adverb modification within TP is related to V. This concept is also true of adverbs in Chinese. Then people may propose that in fact within TP, the order of adverbs is something universal and the only thing people have to learn is to set the parameters. In this case, the author says within TP adverbs in Chinese are left-adjoined while in English they are right-adjoined.

4. Conclusion

This is an attempt to the study of acquisition of syntactic positions of adverbs in the second language acquisition research. So there is something that is worth further studying. First, the examples are only based on adult learners. Maybe it is true for children because in people's view, syntactic positions are determined by UG; second, there may be different developmental stages. The case may be that people first acquire the general distinction of different types of adverbs and then acquire the syntactic positions of adverbs of each type. Anyway, the study of this paper points out that there are 2 aspects about adverbs that we acquire when taking English as a second language: (1) the general positions of adverbs in sentences; (2) the scope of adverbs which is also closely related to syntax. To sum up, the paper illustrates that syntactic positions of adverbs are universally determined and what people have to do is the work of parameter setting, which can be achieved easily through little learning. But just as Ellis (1994) pointed out that people can not expect to achieve native speakers' behavior, because people do sometimes make more mistakes than native speakers do.

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